#### Before the

# Federal Communications Commission Washington, D.C. 20554

In the Matter of	)	
Developing a Unified	)	) CC Docket No. 01-92
Intercarrier Compensation Regime	)	)

## **COMMENTS OF Ionary Consulting**

The Missoula Plan is that most wondrous of compromises, a plan whose executive summary extols the virtues of what it does not even come close to actually doing. It purports to be a unified intercarrier compensation regime, yet it preserves a complex call classification system and actually demands even more stringency in the name of "phantom traffic". It reduces some rate *levels*, but leaves intact most of the complex, anticompetitive, litigation-prone rate *structures* that are the legacy of a baroque, and broken, intercarrier compensation system., and adds new obstacles in the process

The fundamental problem with the Plan, as with most other intercarrier compensation proposals, is that it still uses intercarrier compensation as a subsidy mechanism to hold down retail telephone rates in rural areas. While holding down rates is a laudable goal, doing so in this manner has the perverse effect of stifling the entire telecommunications industry, urban and rural alike. Intercarrier compensation should be limited to recovering *costs* imposed by other carriers. Other mechanisms should be used to subsidize high-cost carriers. This was the apparent intent of the Telecom Act of 1996; Missoula in effect continues the flouting of the spirit of the Act by attempting to further institutionalize and even create new subsidy mechanisms. The

existence of a subsidy mechanism within intercarrier compensation has a malignant structural impact across the entire industry which is not even limited to the narrow cases where the subsidies actually flow.

#### Access charges enshrine obsolete industry structures

Virtually all innovative services today operate in the face of extreme regulatory uncertainty. The existing intercarrier compensation rules were primarily created in the early 1980s, in response to both the *MCI* and *ENFIA* decisions of the late 1970s, which legalized long distance competition, and to the then-impending divestiture of AT&T. The rules specified how *existing* services – essentially, local telephone service and long-distance telephone service – should be handled. They did so in terms of those existing services. And so all new services that come along have only been regulated in terms of pre-existing services. This simply does not work acceptably in practice.

At the time access charges were invented – in practice, as a result of the *ENFIA* decisions of the late 1970s – the primary mechanism for subsidizing high-cost service was separations and settlements. *ENFIA*, and later Access Charges, became an institutionalized mechanism for collecting such subsidies via indirect charges, from IXCs, rather than direct retail rates or surcharges. This led to a complex set of charges levied against IXCs. But long distance calls today are not always sold by IXCs. The trend is towards long distance plans, often flat-rated, sold by one's own local exchange carrier. Thus the originating LEC is the IXC. A mechanism designed to complement divestiture is obsolete when the two largest IXCs have been acquired by the two largest ILECs, and virtually all competitive carriers provide, even if on a resale basis, long distance as well as local service.

The current rules, and the Missoula proposals, ignore these structural changes in the industry. By analogy, one can envision the broader field of telecommunications as a farmer's field. A surveyor could subdivide the field into different tracts. A competent surveyor would define strict lines that

make absolutely clear what tract a given part of the field belongs to. In geometric terms, the larger polygon would be divided into smaller polygons, whose collective areas would be equal to the whole. In contrast, existing rules – which are preserved by the Missoula Plan – are based on identifying spots in the farmer's field, and associating the rest of the land with one or the other. So one part of the field might be near the big oak tree, another near the old well, and a third near the rusty tractor. But the boundaries are not clear, so when the farmer sells the area near the well to one person and the area near the tree to another, conflict results.

What is needed are rules that are at once clear, simple, technologically neutral and economically rational. The Missoula Plan fails this test. Parts of it should be discarded. Other parts of it have merit, but they must be applied carefully.

#### Rates should only reflect costs from the POI or edge

The most straightforward answer to many of the plan's problems is to state, unequivocally, that a carrier should not be allowed to base its compensation rates upon any factor other than those which directly impact its costs.

Terminating carriers should be required to *ignore* the original source of all calls in computing compensation. *All* calls should be treated as "phantom traffic": The place where a call enters and exits a terminating carrier's network (Point of Interconnection, which the Plan replaces with an "edge" concept) may impact that carrier's cost, but the actual place of origin -- whether the call originated on CMRS or LEC, whether the call is intrastate or interstate, whether the call is or is not to an ISP, or whether the call uses "enhanced" or "basic" technology -- should all be irrelevant. Rates should be uniformly billed from a point of interconnection, computed "POI to destination".

The burden of payment then should rest with the immediately-connected carrier delivering the call to the terminating at its POI or edge, not a distant

party such as the originating carrier. The current system of bilateral payments via clearinghouse is needlessly complex and costly to administer. Many calls also fall through the cracks, because it is difficult for a terminating carrier, especially a smaller one, to enforce payment obligations upon a distant carrier. For example, small CLECs often fail to collect access charges from wireless carriers, especially distant wireless carriers who do not interconnect directly with that CLEC. The burden of payment should be moved to the carrier who delivers the call to the CLEC; the originating carrier should make its payments only to the carriers to whom it directly interconnects, including IXCs.

#### Origination charges should not be retained

The Plan eventually reduces most terminating Access charges to the same levels used for local reciprocal compensation. These rates are, if anything, too low, as they are not based on costs. But worse, *originating access* charges remain in the plan. This is a pernicious classification. It allows an originating carrier to say that when one of its subscribers calls another number which it does not deem to be "local", it can charge the recipient of the call a "collect" fee (originating access) for receiving the call. Yet the same originating carrier pays the same terminating carrier a sent-paid fee for handing it a "local" number. This is obviously ripe for gaming, and indeed this is precisely what happens now. While the Missoula Plan has a clearer exemption for ISP-bound Virtual NXX calls, these calls, which are dialed as local and paid for (generally via a monthly flat rate) by the caller, are now subject to Originating Access charges anyway in some states. This is a fine example of the "point" method of regulation which Missoula largely preserves. If a call is "ISP-bound VNXX" then it's exempt, but other novel services that come along may still have to worry about being subjected to Originating Access.

#### Role of the states

The Plan's treatment of intrastate structural reform as voluntary is also troublesome. The FCC has, on many occasions, used its plenary authority over mixed-use services to unify interstate and intrastate rules. For instance, the *Carterfone* decision was opposed by many state regulators, who argued that terminal equipment was jurisdictionally intrastate, and who sought to use it as a subsidy mechanism. The same applies here: So long as providers of novel telecommunications or information services have to face every state's individual rate regimes, their ability to operate is in doubt. Should a service provider refuse to accept customers in states whose intrastate Switched Access (and related) rates are outrageously high and thus make the service potentially unprofitable? Since the boundary between "enhanced" and "basic" is no longer clear, this remnant of call classification has a profound effect on the economy as a whole, and is no more acceptable than the state actions which the Commission rejected in, for instance, FCC 04-267, when it held that *Vonage* service was jurisdictionally interstate and thus not subject to state by state certification.

Indeed we do not hold that the states have no role here. The correct level of intercarrier compensation, levied on a POI-to-destination model, is best left to the states to determine. Reciprocal compensation today is a federal obligation administered by the states. That model is more appropriate for a unified plan than federally-set rates for all calls. State regulators are more able to deal with specific issues of costs, and are more familiar with actual local circumstances.

We note that the very same *Vonage* ruling did not formally address intercarrier compensation issues. VoIP operators who precisely mimic the Vonage model, of which there are many, believe that their "computer to phone" calls are exempt from access charges. This is disputed by some ILECs. Conversely, VoIP operators are sometimes denied terminating

compensation that they believe they may be owed. But in any case it is a case of "points in a field" regulation, rather than having clear rules. Only a *technology-neutral*, classification-free model can really allow unfettered innovation.

Ionary Consulting stands by its original Comments in this Docket, including its response to the several plans put forth in 2004. We still support the gist of the CBICC plan. We also called for, and still call for, the immediate and total abolition of Feature Group A rates. A call that is dialed *like* a local call should be deemed a local call, period. The fact that the recipient of the call may be doing something on its side of the Point of Interconnection should not allow the other carrier to charge extra. This detail is compatible with the NXX-based nature of charges under the Missoula Plan, and should be adopted regardless of the success or failure of the Plan as a whole.

## Intercarrier compensation-based rural subsidies are excessive

The treatment of Track 3 carriers is particularly troublesome. To be sure, reducing their intrastate access charges to interstate levels is beneficial in many cases, noting that *one leg* of such calls can today have charges in excess of eight cents per minute in some states. But the *classification* of calls remain a permanent part of the scene, with access rates set at a level that provides subsidies, and thus encourages litigation over the proper treatment of calls. We are not suggesting that subsidies should never exist, but they should be explicit, via, for instance, the Universal Service Fund mechanism, and not part of intercarrier compensation.

Furthermore, the *level* of subsidies given to USF-eligible carriers should be subject to greater scrutiny. These rate-of-return carriers are the last bastion of gold-plated networks. They have no incentive to use new cost-saving technology (such as wireless mesh networks) to cover their larger areas; rather, they are encouraged to spend wastefully. Thus there are rural carriers planning subsidized builds at over \$10,000/home served. Reducing

the spend level of these companies to rational levels would dramatically reduce the need for subsidies.

The Plan is correct to prevent exchanges acquired by a CRTC from gaining CRTC treatment. The recent rule change allowing USF to be collected on acquired exchanges has apparently prompted a spate of divestitures of rural exchanges by Bells. This has raised USF costs, while lowering the Bells' average cost. Such gaming should not be encouraged, and this aspect of the Missoula plan is laudable.

#### The Edge concept harms competition, especially in rural areas

The concept of "edge" needs to be carefully managed to protect competitors. A small CLEC, for instance, usually has little choice as to where to put its Point of Interface. To the extent that an ILEC gets to define its own edges, CLECs are impaired, especially if they are serving an area remote from where the ILEC puts its edge. For instance, the state of Maine has only one Access tandem. A carrier serving a rural area elsewhere in the state could be required to pay for transport to that tandem, in Portland, even if its traffic is predominantly local and currently goes to the nearest end office or host office.

The rate set in the Plan for this transport appears to be at a level that will literally make competition impossible in many areas. Section II.B discusses "dedicated transport" charges and how intrastate rates should, over time, be equalized to interstate rates. But Access tariffs have supercompensatory rates that features extremely high mileage charges, apparently based upon 1980s pre-fiber-optic cost structures plus 1980's-level subsidy structures. DS1 rates of \$20/mile are common, and not much different interstate and intrastate. Indeed, in some states, intrastate switched access transport rates are lower than special access dedicated transport rates, and far lower than corresponding interstate rates. In contrast, cost-based rates are usually under \$1/DS1/mile. So a competitive carrier whose service area is, say, 100

miles from the tandem edge could be charged over \$2000/DS1 in new mileage charges.

The net effect of the edge concept, as drawn, is to favor large, urban CLECs who interconnect at tandem switches and provide Virtual NXX service to outlying rural areas, and to harm rural CLECs, including cable and wireless providers, who interconnect within their local service areas to provide local exchange service. While Virtual NXX service should be permitted, as the Plan does, the Plan should not create a new burden on those carriers who actually do provide local service in rural areas far from access tandems. In the past, some ILEC have implemented a "GRIP" (geographically-relevant interconnect point) requirement, such that CLECs' POIs had to be within the ILEC-defined local calling areas. This was not based on cost, but did force some CLECs to configure their networks accordingly. The Plan, in contrast, often requires that the POI be *outside* of the local calling area.

Terminating carriers should be allowed to recover their costs, including those of transport where it is necessary. But existing non-cost-based Access tariffs should play no part in computing these rates. Consistent with the Telecom Act's requirements, competitive carriers should be allowed to create POIs at any ILEC end office, paying only cost-based rates for transport and termination.

The Plan distinguishes between Access traffic and local traffic, with the edge concept applying only to local traffic. This relic of the classification system creates a needless complication of interface arrangements, and is another reason why a fully-unified intercarrier system, with no access tariffs, is required. Under the Plan, different rates will apply based upon arbitrary call classifications, and carriers will continue to litigate over the cost of interconnection arrangements until doomsday or the final adoption of unified compensation, whichever comes first.

A further problem that the Plan creates for rural CLECs is its apparent asymmetric treatment of CLEC compensation. A rural ILEC is entitled to higher payments than a CLEC serving the same area. This is blatantly anticompetitive. CLECs serving rural areas generally have higher costs than those in urban areas, just as with ILECs, though CLECs typically have far lower costs than the subsidized ILECs that the Plan protects. The net impact would not only be to shut down competition, but to raise overall costs to all subscribers, via higher USF contributions. CLECs should be allowed to mirror ILEC rates, including Track 3 carrier rates.

#### Phantom traffic should not be seen as a problem at all

The Plan reinforces the existing system of call classification by taking steps against "phantom traffic". It requires that calls be sent with accurate source information, so that the bill can be based upon originating NPA-NXX. This reflects the way the historical, electromechanical telephone network operated, but creates a serious burden upon future applications. Telephone numbers identify the caller, not just a telephone instrument or line. Nowadays, with mobile phones becoming more common than wireline phones, a caller may not wish that his call be identified with the telephone number from which is he calling, but with himself.

This is analogous to electronic mail's "From:" field, which identifies the user as he chooses to be identified, not the specific computer from which he happens to be sending mail. The Missoula Plan's rigid insistence on locking Caller ID to the originating line is tantamount to legislating that email all behave the way it did in the ARPAnet era when email addresses usually identified the user's timesharing computer system and login name, and remote access to email was handled by logging in remotely via TELNET. While fraudulent Caller ID, for example as could be used by telemarketers, should not be permitted, proper use of Caller ID or ANI should not need to be part of intercarrier compensation. If calls are charged POI-to-destination,

then there is no reason to prohibit, for instance, a service that allows one's wireline and wireless phones to display the same Caller ID to the call recipient, or allows a telecommuter to display his office phone's number when calling from home. Such enhanced services are possible today, but would be banned under this Plan.

The "phantom" issue could also impact VoIP traffic, and, depending on how it is interpreted, provide either further impetus for customers to abandon most TDM carriers in favor of VoIP services that have preferential regulatory treatment, or to discourage VoIP services from interconnecting to the PSTN at all. VoIP services differ widely in how they treat originating numbers. Some, like Skype, do not assign PSTN numbers to individual subscribers, so Skype-out can only assign a number from its own gateway. Others reoriginate calls at a gateway (these are presumably a major source of "phantom" calls), while some pass the originating caller's PSTN number. Forcing all of these to operate in a historical PSTN mold would stifle innovation. Exempting only VoIP services from these rules would also stifle innovation, because there is no good reason why VoIP per se should be accorded preferential treatment. Tremendous innovation is still possible within the context of TDM and SS7-based services, but it has been impeded by complex intercarrier compensation rules which sacrifice service in the name of billing, and in particular in the name of subsidizing rural carriers. Missoula does nothing to help this, and indeed could put further brakes on most innovation, ultimately harming the industry and the country as a whole.

For these and other reasons, we call for the Commission to reject much of the Missoula Plan, and instead adopt a unified intercarrier compensation plan consistent with its originally-expressed goals.

Respectfully submitted this 25<sup>rd</sup> day of October, 2006.

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